

AMENDMENTS TO SPECIFICATION

Please amend the specification as follows:

Page 1, lines 13-15:

Field of the Invention:

The invention relates to a hollow section with internal reinforcement, especially hollow sections as are defined within structural framework for use in car bodies, as well as a method of producing the hollow section.

Page 3, lines 2-9:

Summary of the Invention:

The object of the invention is to provide a hollow section, particularly a section formed by vehicle framework sheet metal that is enclosed by an opposing sheet metal, and a corresponding production method which overcomes the above-noted deficiencies and disadvantages of the prior art devices and methods of this kind, and wherein a corrosion protection medium can reach all areas of the hollow section and a high degree of rigidity can be achieved without a substantial increase in weight or enlargement of the cross section.

Page 3, lines 10-13:

With the above and other objects in view there is provided, in accordance with the invention, a method of producing a hollow section with internal reinforcement, and particularly an automotive vehicle body structure having a hollow section defined therein, which comprises:

Page 3, line 14:

coating a solid core material with activatable polymeric material;

Page 3, lines 15-17:

enclosing the solid core material and the activatable polymeric material with an outer plate to form an assembly with a defined cavity inside the outer plate;

Page 3, lines 21-23:

subsequently passing the assembly to a drying oven for initiating foaming of the activatable polymeric material and filling the cavity defined cavity with the activatable polymeric material.

Page 4, lines 2-14:

In other words, the objects of the invention are satisfied with a hollow section having internal reinforcement, especially for use in car bodies, in which a core material is coated with activatable polymeric material and an outer plate is disposed to form a cavity, the size of the cavity being such that it can be completely filled by the operation of foaming the activatable material, and the solid core material being formed from a foamed or unfoamed metallic material or from a synthetic material reinforced with metal fibers, carbon fibers or glass fibers. The possibility exists of forming the solid core material with a flexurally rigid hollow section. Advantageously, the solid core material is coated with the activatable polymeric material only in some areas.

Page 7, lines 7-9:

Brief Description of the Drawings:

Fig. 1 is a diagrammatic section view of a hollow section before foam-filling foaming of the activatable polymeric material;

Page 7, line 11:

Fig. 2 is a similar view of the structure after foam-filling foaming of the activatable polymeric material;

Page 7, line 17-19:

Fig. 4A to 4D are various section and partly perspective views of various alternative embodiments of sections coated with foamable polymeric material.

Pages 7, lines 21-26 and page 7, lines1-6:

Description of the Preferred Embodiments:

Referring now to the figures of the drawing in detail and first, particularly, to Fig. 1 thereof, there is seen a solid core material 1 coated with an activatable material 2. An outer plate 4 is disposed to form a cavity 3. The cavity 3 is completely filled by the operation of foaming the activatable material 2. The size of the cavity 3 is predetermined in accordance with the particular application. For this purpose, spacers 5 (as part of the coating 2) are used and, according to Figure 1, are disposed on the inside of the outer plate 4. According to Figure 3, the solid core material 1 is formed by a flexurally rigid hollow section 6.

Page 8, lines 8-18:

Before the foaming operation, the hollow section 6 is passed to a corrosion protection dipping bath. Because the inside of the outer plate 4 is still freely accessible in this condition, the corrosion protection agent can reach all areas of the inner section. The coating of the core material 1 takes place at a temperature which is lower than the stoving temperature for the anticorrosion layer applied in the drying oven. This higher temperature in the drying oven results in drying of the anticorrosion layer and a reaction of the coating material, as a result of which the foaming operation is initiated and the cavity 3 which has been deliberately formed is filled with foam.

Page 8, please insert the following new paragraphs after last paragraph of this page:

Turning to Figs. 4C and 4D, those drawings depict a method of reinforcing a automotive vehicle structure having a hollow section comprising the steps of:

- a) coating a solid core material with an activatable polymeric material of generally uniform thickness, wherein the solid core material 1 is characterized by a profile that includes a first semielliptical portion 7 and a second adjoining semielliptical portion 8, each of the first semi-elliptical portion and the second semi-elliptical portion having a smooth and continuous concave first surface 9 and an opposing convex outer surface 10, the outer convex surface further being characterized by a plurality of projecting peaks 11 and valleys 12, the peaks and valleys each including parallel side walls 13 and an upper surface 14 that is generally parallel to the concave first surface;
- b) folding the first and second semielliptical portions relative to each other about an axis where the portions adjoin each other, for forming an elliptical inner surface having a major axis, so that the side walls defining the peaks and valleys of the outer convex surface are orthogonally oriented relative to the major axis;
- c) enclosing the solid core material and the activatable polymeric material within the hollow section of the automotive vehicle structure;
- d) passing the assembly to a corrosion treatment bath and subjecting the assembly to a corrosion protection agent; and
- e) subsequently passing the assembly to a drying oven for drying the corrosion protection agent and for initiating foaming of the activatable polymeric material and filling the defined cavity with the activatable polymeric material.

Figs. 4A illustrates a construction consistent with that of Figs. 4C and 4D, but having foldable flat portions 15 and 16 instead of the semilliptical portions.

Fig. 5A illustrates a construction by which a plurality of adjoining hexagonal sections 17 are covered with activatable material 2.